

# Patent [19]

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## [54] DEODORIZING APPARATUS

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## [57] ABSTRACT

**PROBLEM TO BE SOLVED:** To decompose and deodorize malodorous components more effectively by arranging a plate material supporting a photocatalyst and with numerous holes made therein in multiplicity to be extended in the direction of an angle to the main direction of the flow of air in an air path.

**SOLUTION:** Both ends of a cylindrical casing 1 is closed by lids 2 and a suction port 3 is provided near one end side while an exhaust port 4 near the other end side. A dusting filter 5 is provided at the suction port 3. An inner pipe 7 comprising glass is put through along the center axis of the casing 1 and an ultraviolet lamp 8 is received therein as exciting light source. Annular punching metals 12 as carrier of a photocatalyst are arranged in multiplicity at a specified interval inside the casing 1 to make a deodorizing chamber 11. The numerous plate-shaped punching metals 12 supporting the photocatalyst inside are arranged in multiplicity being inclined slightly. This achieves a higher contact efficiency between the air containing malodorous components and the photocatalyst to promote a catalytic reaction, thus upgrading deodorizing effect.

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